

Usual and successful cognitive aging and health factors

Citation for published version (APA):

Houx, P. J., Vreeling, F. W., & Jolles, J. (1992). Usual and successful cognitive aging and health factors. *International Journal of Psychology*, 27(3-4), 389.

Document status and date:

Published: 01/01/1992

Document Version:

Publisher's PDF, also known as Version of record

Please check the document version of this publication:

- A submitted manuscript is the version of the article upon submission and before peer-review. There can be important differences between the submitted version and the official published version of record. People interested in the research are advised to contact the author for the final version of the publication, or visit the DOI to the publisher's website.
- The final author version and the galley proof are versions of the publication after peer review.
- The final published version features the final layout of the paper including the volume, issue and page numbers.

[Link to publication](#)

General rights

Copyright and moral rights for the publications made accessible in the public portal are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

- Users may download and print one copy of any publication from the public portal for the purpose of private study or research.
- You may not further distribute the material or use it for any profit-making activity or commercial gain
- You may freely distribute the URL identifying the publication in the public portal.

If the publication is distributed under the terms of Article 25fa of the Dutch Copyright Act, indicated by the "Taverne" license above, please follow below link for the End User Agreement:

www.umlib.nl/taverne-license

Take down policy

If you believe that this document breaches copyright please contact us at:

repository@maastrichtuniversity.nl

providing details and we will investigate your claim.

THEMATIC SESSIONS

DEVELOPMENTAL NEUROPSYCHOLOGY (TH067)

TH067.1

Neuroanatomical (MRI) and neuropsychological indications of cerebral asymmetry in autism and childhood leukemia. *Cieselski, K.T.(1)*, Yonofsky, R.(2), Ludwig, R.(3), Allen, P.S.(2), Snyder, T.(2), Pabst, H.(2), Akabutu, J.(2), & Hart, B.(1) (1) *University of New Mexico, Albuquerque, USA*; (2) *University of Alberta, Canada*; (3) *Cross Cancer Institute, Edmonton, Canada*. High functioning autistic subjects (As) and post-treatment (chemo- and radiation-therapy) survivors of childhood acute lymphoblastic leukemia (ALLs) exhibit an intriguing inverse pattern of neuropsychological deficits: As are proficient at visuo-spatial organization but have pervasive language abnormality; ALLs exhibit normal speech-language-thinking but are defective in visual searching. The pattern of deficits suggests a pathology of L-hemisphere in As and R in ALLs. Planimetric measurements (mm^2) of the Frontal Temporal and Occipito-Parietal brain areas, on axial and coronal brain sections, were made on MRI Images from As, ALLs and health controls (10 subjects per group). The pattern of cortical measurements was not as anticipated from the neurobehavioral deficits and analysis of subcortical structures is in progress.

TH067.2

Comparison of assessment definitions of attention deficit for statistical validity. *Cleaves, W.T.*, Palmerton, R.D., & Mathews, J.L. *California State University San Bernardino, California, USA*. Thirty-three children (7-12 years) of normal intelligence were administered an extensive psychoeducational and neuropsychological battery. A series of assessment definitions of attention deficit were compared for their statistical validity in predicting performance on attention sensitive measures. A ratio measure of Kaufman's FDDQ index to FSIQ, as well as children's relative Trails-B performance were predictive of attention deficit severity ($p < .02$) and covaried independent of children's specific VIQ, PIQ or FSIQ ability.

TH067.3

Evolution of non-verbal communication behaviour in patients suffering from Alzheimer's disease. de Lannoy, J.-D., *Roesli, D.*, & Séguret, V. *Université de Genève, RAPSE, Switzerland*. Observations of non-verbal communication behaviour of 16 hospitalised patients suffering from Alzheimer's disease were made every 30" during periods of 15' over 18 months. (1) The distribution of the degree of variation in frequencies of the hand's gestures, positions of the head and directions of the look, enabled us to discriminate several acts of patients grouped under a common psychiatric syndrome; (2) the evolution in time of these behaviour's frequencies is in relation with the evolution of the disease.

TH067.4

Usual and successful cognitive aging and health factors. *Houx, P.J.*, Vroeling, F.W., & Jolles, J. *Department of Neuropsychology and Psychobiology, University of Limburg, The Netherlands*. Normal and healthy individuals ($n=262$) with ages ranging from 20 to 90 underwent extensive neuropsychological and neurological testing. A subdivision of these subjects was made, based on the occurrence of mild health factors possibly affecting brain functioning. Substantial differences in cognitive test performance were found between subjects who had been affected by such health factors and subjects who had not. These differences increased with the age of the subjects. Health factors accounted for a substantial part of the individual variability that increased with age. It was hypothesized that the absence or presence of health factors constitute an important determinant for successful aging.

TH067.5

Event-related potentials in reading disabled and attention deficit disordered children. *Hunter, M.*, Fulham, R., & Frost, B. *University of Newcastle, NSW, Australia*. Reading disabled and attention deficit disordered school children were matched and compared with normal controls on measures of evoked response. Visual stimuli varying in their linguistic content from abstract patterns through nameable objects to words were briefly presented on a TV monitor. The subjects were required to identify match and mismatch combinations of stimuli. Event Related Potentials (ERPs) were recorded from scalp electrodes during the performance of the task. Reaction times, evoked potential wave forms and derived topographic maps of electrical